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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/052,502	01/23/2002	Hiroshi Shimura	R2184.0131/P131	4994
24998	7590	04/21/2005	EXAMINER	
DICKSTEIN SHAPIRO MORIN & OSHINSKY LLP			CHANG, JON CARLTON	
2101 L Street, NW			ART UNIT	
Washington, DC 20037			PAPER NUMBER	

2623

DATE MAILED: 04/21/2005

Please find below and/or attached an Office communication concerning this application or proceeding.

Office Action Summary	Application No. 10/052,502	Applicant(s) SHIMURA, HIROSHI	
	Examiner Jon Chang	Art Unit 2623	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --
Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☐ Responsive to communication(s) filed on ____.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 1-20 is/are pending in the application.
- 4a) Of the above claim(s) ____ is/are withdrawn from consideration.
- 5) ☐ Claim(s) ____ is/are allowed.
- 6) ☒ Claim(s) 1,2,5,9,11,12,15 and 19 is/are rejected.
- 7) ☒ Claim(s) 3,4,6-8,10,13,14,16-18 and 20 is/are objected to.
- 8) ☐ Claim(s) ____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☒ The specification is objected to by the Examiner.
- 10) ☒ The drawing(s) filed on 23 January 2002 is/are: a) ☒ accepted or b) ☐ objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) ☒ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☒ All b) ☐ Some * c) ☐ None of:
1. ☒ Certified copies of the priority documents have been received.
 2. ☐ Certified copies of the priority documents have been received in Application No. ____.
 3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- | | |
|--|--|
| 1) <input checked="" type="checkbox"/> Notice of References Cited (PTO-892) | 4) <input type="checkbox"/> Interview Summary (PTO-413)
Paper No(s)/Mail Date. ____ |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948) | 5) <input type="checkbox"/> Notice of Informal Patent Application (PTO-152) |
| 3) <input checked="" type="checkbox"/> Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08)
Paper No(s)/Mail Date <u>1/23/02</u> . | 6) <input type="checkbox"/> Other: ____ |

Specification

1. The disclosure is objected to because of the following informalities:
 - a) On page 9, at line 20, it appears that "11b" should read, "11c".
 - b) In equations (2) and (3), on pages 11 and 12, "C(a)" and "C(b)" are not defined.
 - c) On page 15, lines 18-19, "the target mark is more resemble..." is not grammatically correct.
 - d) On page 16, line 9, "the target mark is more resemble..." is not grammatically correct.

Appropriate correction is required.

2. The specification is objected to as failing to provide proper antecedent basis for the claimed subject matter. See 37 CFR 1.75(d)(1) and MPEP § 608.01(o). Correction of the following is required: the specification does not provide antecedent basis for "area balance" as recited in claims 5 and 15.

Claim Objections

3. Claims 1 and 11 are objected to under 37 CFR 1.75(a) for failing to particularly point out and distinctly claim the subject matter which applicant regards as the invention.

a) In claim 1, at lines 5-6, "...how much it resembles to the element..." is not grammatically correct. See also claim 11.

b) In claim 1, at line 8, "positional relationship therebetween" is unclear.

Therebetween what? In other words, it is not clear between what things the positional relationship is being measured. See also claim 11.

c) In claim 1, at lines 12-13, "using...synthetically" is unclear. See also claim 11.

Claim Rejections - 35 USC § 112

4. Claims 5 and 15 are rejected under 35 U.S.C. 112, first paragraph, as failing to comply with the enablement requirement. The claim(s) contains subject matter which was not described in the specification in such a way as to enable one skilled in the art to which it pertains, or with which it is most nearly connected, to make and/or use the invention.

Claim 5 recites, "wherein said examining part examines area balance on each image part." Claim 15 has a similar recitation. The specification does not explain how "area balance" is examined on each image part. In fact, the term "area balance" does not even occur in the detailed description portion of the specification. One of ordinary skill in the art would not be able to make or use the invention as claimed in claims 5 and 15, based on the present disclosure coupled with information known in the art, without undue experimentation.

Claim Rejections - 35 USC § 102

5. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

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A person shall be entitled to a patent unless –

(b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

6. Claims 1, 2, 9, 11, 12 and 19 are rejected under 35 U.S.C. 102(b) as being anticipated by U.S. Patent 5,008,946 to Ando.

Regarding claim 1, Ando discloses an image recognition system comprising:

an examining part which examines as to how much input image parts resemble a predetermined figure comprising a plurality of elements (column 4, line 67 to column 5, line 44; the predetermined figure is a face, and the elements are elements of the face, such as the pupils, nose and mouth), and gives a first score on each image part as to how much it resembles to the element of the predetermined figure (column 18, line 65 to column 4; note that Ando discloses determining if the black regions "agree well" with that of human eyes, which implies a degree of coincidence, i.e., a score; note also column 26, lines 13-17, which discusses the "degree of certitude"), and gives a second score on the image parts as to how much a positional relationship therebetween resembles that of the elements of the predetermined figure (column 5, lines 24-34; column 24, line 43-44); and

a determining part which determines as to whether or not the input image parts coincide with the predetermined figure by using the first respective scores and the second score synthetically (column 5, lines 39-42; note that the degree of similarity must inherently use the first score, as without it, the system could not determine the second score; note also the "degree of certitude" of the face, column 26, line 29).

As to claim 2, Ando discloses the system as claimed in claim 1, wherein: said examining part comprises a measurement part which measures the number of pixels each having a gray-scale level higher than a predetermined threshold on a foreground part, and measures the same on a background part of each image part, and a first scoring part which gives a score as to relationship between the thus-measured numbers of pixels (column 15, lines 7-18; note that the measurements are based on a histogram, which is a measure of the number of pixels, and the black hair is the foreground; the score would be the B values).

As to claim 9, Ando discloses the system as claimed in claim 1, wherein: said determining part calculates a difference between an ideal arrangement of the respective elements of the predetermined figure and an actually measured arrangement of the respective input image parts (column 23, line 45 to column 24, line 23; column 24, line 42-43; the degree of certitude is a measure of the amount of certainty, or impliedly the difference from the reference).

With regard to claims 11-12 and 19, the discussion provided above for claims 1, 2 and 9, respectively, are applicable.

Allowable Subject Matter

7. Claims 3-4, 6-8, 10, 13-14, 16-18 and 20 are objected to as being dependent upon a rejected base claim, but would be allowable if rewritten in independent form including all of the limitations of the base claim and any intervening claims.

Subject Matter Not Found in the Prior Art

8. The subject matter of claims 5 and 15 have not been found in the prior art. However, allowability cannot be indicated because of the rejection under 35 U.S.C. § 112, first paragraph.

References Cited

9. The prior art made of record and not relied upon is considered pertinent to applicant's disclosure.

U.S. Patent 6,463,176 to Matsugu et al. discloses an image recognition/reproduction system which compares local feature element patterns and their positions with reference patterns, to develop a matching score. However, the patent does not disclose a second (i.e., separate) score for the positional relationship between the elements.


Contact Information

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Jon Chang whose telephone number is (571) 272-7417. The examiner can normally be reached on M-F 8:00 a.m.-6:00 p.m..

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Amelia Au can be reached on (571)272-7414. The fax phone number for the organization where this application or proceeding is assigned is 703-872-9306.

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Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).


Jon Chang
Primary Examiner
Art Unit 2623

Jon Chang
April 18, 2005